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#### REMARKS

Applicants appreciate the thorough examination of the present application as evidenced by the Office Action of December 13, 2007 (hereinafter "Office Action"). In response, Applicants have amended independent Claims 1, 20, and 39 and dependent Claims 2, 3, 5, 6, 7, 14, 18, 24, 25, 26, 33, 40, 42, and 43 to clarify the recitations thereof, as noted above. No new matter has been added.

Accordingly, Applicants respectfully submit that the pending claims are patentable for at least the reasons discussed below.

## Independent Claims 1, 20, and 39 Are Patentable Over Roth

Claims 1-7, 9-20, 23-35, and 37, 39-73 are rejected under 35 U.S.C. §102(e) as being anticipated by U.S. Patent Publication No. 2004/0049388 to Roth et al. (hereinafter "Roth"). Amended Claim 1, for example, recites:

1. An apparatus, comprising:
a display configured to display various readable data; and
a control unit configured to extract at least a part of the displayed
data and configured to send the extracted part of the displayed data to a
speech generating device that is configured to generate speech from the
extracted part of the displayed data,

wherein the speech generating device is external to and attachable to the apparatus, and wherein the control unit is configured to send the extracted part of the displayed data to the speech generating device at a rate that is controlled in response to user interaction with the display comprising scrolling in the display and/or a voice control input. (Emphasis added).

The Office Action asserts that Roth discloses all of the recitations of Claim 1. *See* Office Action, Page 3. For example, the Office Action relies on Paragraphs 0120 and 0034 of Roth as disclosing a speech generating device, and relies on Paragraphs 0371 to 0373 of Roth as disclosing a control unit configured to send an extracted part of displayed data to the speech generating device at a rate based on scrolling in the display. *See* Office Action, Pages 3-4.

However, Applicants respectfully submit that Roth fails to disclose or suggest at least

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that the cited Paragraphs 0120 and 0034 of Roth describe speech <u>recognition</u>, not speech <u>generation</u>. See Roth, Paragraphs 0120 and 0034. Nevertheless, Applicants acknowledge that Roth describes a speech recognition system for mobile phones and handheld computers that includes text-to-speech (TTS) conversion for use, for example, when a user is driving a car or otherwise occupied. See Roth, paragraph 0363. As described in a cited portion of Roth:

[0371] If the user scrolls an item in the correction window, functions 9448 and 9450 use TTS to say the currently highlighted choice and its selection number in response to each such scroll. If the user scrolls a page in a correction window, functions 9452 and 9454 use TTS to say that newly displayed choices as well as indicating the currently highlighted choice.

[0372] When in correction mode, if the user enters a menu, functions 9456 and 9458 use TTS or free recorded audio to say the name of the current menu and all of the choices in the menu and their associated numbers, indicating the current selection position. Preferably this is done with audio cues that indicate to a user that the words being said are menu options.

[0373] If the user scrolls up or down an item in a menu, functions 9460 and 9462 use TTS or pre-recorded audio to say the highlighted choice and then, after a brief pause, any following selections on the currently displayed page of the menu.

Roth, Paragraphs 0371-0373 (emphasis added).

Accordingly, the above portion of Roth describes controlling text-to-speech conversion by a TTS in response to scrolling in a menu and/or a correction window. However, nowhere does the cited portion of Roth disclose or suggest that the <u>rate</u> at which data is sent to the TTS <u>is controlled in response to the scrolling</u>. In other words, while Roth may disclose that scrolling may control the <u>output</u> of the highlighted data by the TTS, the cited portion of Roth does not disclose or suggest that the scrolling may control the <u>rate</u> at which the data is sent to the TTS. Applicants further note that the TTS of Roth 'says' each highlighted choice "after a brief pause". Roth, Paragraph 0373. As such, Applicant submits that Roth teaches away from controlling the rate at which data is sent to the TTS (and thus the

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rate of output of the speech signal) in response to scrolling in the display, as the TTS of Roth nevertheless provides a brief pause between 'saying' each highlighted choice. *See* Roth, Paragraph 0373. Thus, Applicants submit that the cited portions of Roth do not disclose or suggest sending the extracted part of the display name to a speech generating device "at a <u>rate</u> that is controlled in response to...scrolling in the display", as recited by amended Claim 1.

Applicants further note that the speech generating device of amended Claim 1 is "external to and attachable to the apparatus". More particularly, as described in the present specification, the speech generating device "is implemented as an accessory. The accessory is to be attached to the mobile phone 1 via its system connector." *See* Specification, Page 5, lines 4-5. However, nowhere does the cited portion of Roth disclose or suggest such an external and attachable speech generating device. Rather, as illustrated in Figure 10 of Roth, the text-to-speech programming 1028 is included within the apparatus 900. *See* Roth, Fig. 10. In other words, the TTS described in Roth is <u>integrated</u> in the apparatus of Roth, and as such, is <u>not external and attachable</u> thereto. Moreover, Roth describes text-to-speech <u>programming</u>, not an external speech generating <u>device</u>. Thus, Applicants submit that Roth does not disclose or suggest a speech generating device "external to and attachable to the apparatus", as recited by amended Claim 1.

Accordingly, as the cited portions of Roth fail to disclose or suggest all the recitations of amended Claim 1, Applicants submit that amended Claim 1 is patentable over Roth for at least these reasons. Amended Claims 20 and 39 similarly recite sending the extracted portion of displayed data to a speech generating device "at a rate that is controlled in response to...scrolling in the display", and as such, are patentable for at least similar reasons. Also, dependent Claims 2-7, 9-19, 23-37, and 41-43 are patentable at least per the patentability of Claims 1, 20, and 39 from which they depend.

### Many of the Dependent Claims Are Separately Patentable

As discussed above, Applicants note that the dependent claims are patentable at least per the patentability of independent Claims 1, 20, and 39 from which they depend. Moreover, Applicants submit that various dependent claims are separately patentable.

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For example, amended Claims 2, 3, and 5 recite, in part, sending the extracted part of the displayed data to the speech generating device "a line or a word at a time". The Office Action argues that Roth discloses the recitations of Claims 2, 3, and 5 in Paragraphs 0371 – 0373. See Office Action, pages 4 – 5. However, as discussed above with reference to Claim 1, Applicants note that the cited portions of Roth describe text-to-speech (TTS) conversion of selected words and/or characters based on scrolling and/or other movement of a cursor. See also Roth, Paragraph 0369. In particular, Roth discusses using TTS "to say the currently highlighted choice". See Roth, paragraph 0371. However, Applicants note that saying highlighted data responsive to a user selection does not disclose or suggest sending the data to the TTS a line or a word at a time. Nor does the Office Action rely on cited PCT Publication WO 01/57851A1 to Freeland et al. as disclosing these recitations. Thus, Applicants submit that Claims 2, 3, and 5 are separately patentable for at least these reasons.

Also, amended Claim 6 recites, in part, that the control unit is configured to send the extracted portion of the displayed data to the speech generating device "responsive to input of spaces and/or punctuation marks via the keypad." In rejecting Claim 6, the Office Action asserts that Paragraphs 0025, 0154, 0184, and 0270 of Roth disclose these recitations. See Office Action, Page 5. However, Applicants note that the cited portions of Roth describe a punctuation recognizing mode for speech recognition, not for text-to-speech conversion. See Roth, Paragraphs 0025, 0154, 0184, and 0270. For example, as described in a cited portion of Roth, when "the user taps on the Punctuation Vocabulary button...[t]his starts utterance recognition causing the utterance of the word "period"...to give rise to the correction pointed to by 3304 in which the punctuation mark "." is shown". Roth, Paragraph 0270. Thus, while Roth may describe recognition of punctuation characters spoken by a user, nowhere do the cited portions of Roth disclose or suggest sending displayed data to a speech generating device responsive to a space and/or punctuation mark entered via a keypad. Accordingly, Applicants submit that amended Claim 6 is patentable for at least these reasons. Amended Claims 25 and 42 include similar recitations, and are thus also separately patentable for at least similar reasons.

In addition, amended Claim 18 recites, in part, that "the speech generating device

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includes a functional cover comprising a shell configured to cover a front of the apparatus and a microprocessor configured to cooperate with the control unit of the apparatus". However, as discussed above with reference to Claim 1, nowhere do the cited portions of Roth disclose or suggest such an external and/or attachable speech generating device; rather, the text-to-speech programming 1028 of Roth is integrated within the apparatus 900. *See* Roth, Figs. 9-10. Thus, Applicants submit that amended Claim 18 is separately patentable for at least these reasons.

Furthermore, amended Claim 14 recites, in part, that "a speed of the speech signal is varied in response to a speed of the scrolling in the display". The Office Action asserts that Paragraph 0355 of Roth discloses these recitations. *See* Office Action, Page 5. However, while the cited portion of Roth describes a menu selection "which gives the user finer control over audio navigation speed", Applicants submit that the cited portion of Roth does not disclose or suggest that the audio navigation speed is varied in response to a speed of scrolling in the display. Roth, Paragraph 0355. Accordingly, Applicants submit that amended Claim 14 is separately patentable for at least these reasons. Amended Claims 33 and 43 include similar recitations, and are thus also separately patentable for at least similar reasons.

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### **Conclusion**

Accordingly, in light of the above amendments and remarks, Applicants respectfully submit that all of the pending claims are now in condition for allowance. Thus, Applicants respectfully request allowance of the pending claims and passing the application to issue. Applicants encourage the Examiner to contact the undersigned by telephone to resolve any remaining issues.

Respectfully submitted,

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# CERTIFICATION OF ELECTRONIC TRANSMISSION UNDER 37 CFR § 1.8

I hereby certify that this correspondence is being transmitted via the Office electronic filing system in accordance with \$1.520(4) to the U.S. Patent and Trademark Office on March 11, 2008.

Betty Lou Rosser

Date of Signature: March 11, 2008